Federal Voting Assistance Program

Welcome to Secure Electronic Registration and Voting Experiment (SERVE) Overview

SERVE
Secure Electronic Registration and Voting Experiment

May 22, 2002

Meeting Objectives:

- Provide information to Service IT community
- Get feedback

FVAP Mission is to:

- Administer the *Uniformed and Overseas Citizens Absentee Voting Act (UOCAVA)*
- Inform and educate U.S. citizens worldwide of their right to vote
- Foster voting participation
- Protect the integrity of and enhance the electoral process

UOCAVA Covers:

More than six million potential vo

3.5 million overseas civilians, not affiliate
with the federal government
.1 million federal civilian employees over
1.4 million military
1.3 million military dependents of voting a

SERVE SCOPE

- Scalability in election administration process, affordability
- Large scale Federal/State/local demonstration program
  - Multiple states and counties
  - 200,000 voters
- Remote absentee registration and voting for 2004 primaries and general election

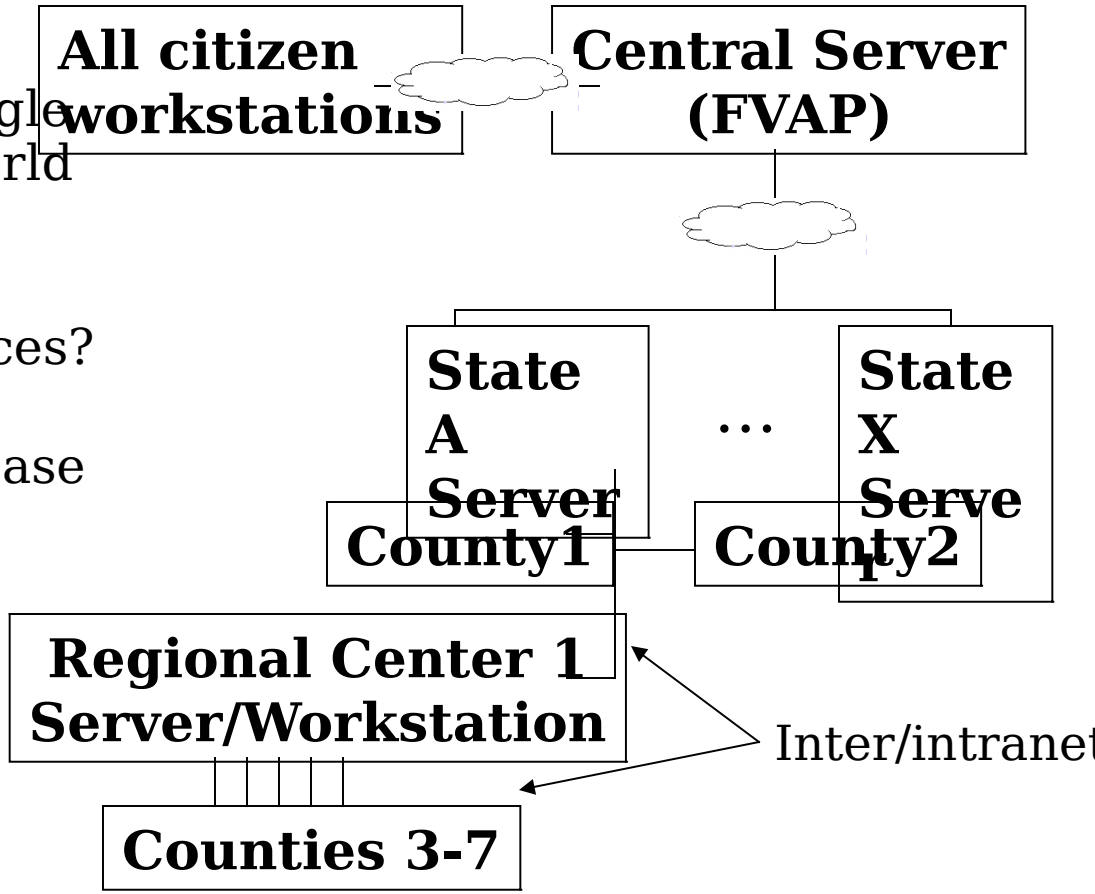
Basic Questions

- Is remote electronic registration and voting an effective, affordable method to improve *UOCAVA* access to the polls?
- What do we need to know to implement this type of system as an alternative to by-mail?

Conceptual SERVE Architecture

FEATURES

- FVAP central server single interface to external world
- One system within each state
- Share hardware resources?
- Automated mapping to voter registration database
- Use of common ballot generation tool
- Tabulation built in, electronic reporting
- Embedded e-mail



SERVE Functionality: Citizens

- Register remotely
- Check registration status
- Update registration information
- Review blank ballot
- Vote ballot remotely
- Return ballot
- Check vote status
- Communicate with Local Election Official via email

SERVE Functionality: FVAP Central Server

- Provide single point of citizen access
- Identification and authentication of all users and transactions
- “Postmark” all transactions
- Provide electronic FPCAs on request
- Route transactions to/from states
- Monitor system status
- Provide system audit trail

SERVE Functionality: State Central Server

- Interface to FVAP server for all state jurisdictions
- Route transactions to/from counties
- Provide blank ballots on request
- Monitor state system status
- Provide state system audit trail

SERVE Security Elements

- Multiple layers of security to achieve acceptable risk
  - Object security
    - Digitally signed, encrypted
  - Transmission security
    - Secure sockets layer
  - Operational security
    - Intrusion detection system
  - Physical security
  - Personnel security

SERVE User Authentication Standard

- Medium Level Assurance Digital Certificate (X.509)
  - Integrity
  - Identification and authentication
  - Non-repudiation
  - Confidentiality
  - Multiple certificate authorities
    - DoD Public Key Infrastructure (PKI)
    - Commercial Vendors
    - State Products

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